D EPODGO / EPO

PN - JP9188507 A 19970722

PD - 1997-07-22

PR - JP19960000652 19960108

OPD - 1996-01-08

TI - FULLERENE OLIGOMER AND ITS PRODUCTION

IN - OSAWA SHUICHIONOE JUNTAKEUCHI KAZUO

PA - RIKAGAKU KENKYUSHO

IC - C01B31/02; B01J3/06

O WPI / DERWENT

 Fullerene oligomer - consisting only of carbon atoms bonded to each other by single or double covalent bond, and having three dimensional structure

PR - JP19960000652 19960108

PN - JP9188507 A 19970722 DW199739 C01B31/02 011pp

PA - (RIKA) RIKAGAKU KENKYUSHO

IC - B01J3/06;C01B31/02

J09188507 Fullerene oligomer is characterised in that it consists of only carbon atoms which are bonded to each other by single or double covalent bonds, has a three-dimensional structure and a continuous hollow, and is insoluble in toluene. Also claimed is the preparation of the fullerene oligomer, which is characterised by polymerising a fullerene compound in a solvent under ultrahigh pressure.

- ADVANTAGE - A new fullerene oligomer which is different from known fullerene oligomers or polymers can be obtained.

- (Dwg. 0/8)

OPD - 1996-01-08

AN - 1997-420436 [39]

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PN - JP9188507 A 19970722

PD - 1997-07-22

AP - JP19960000652 19960108

IN - OSAWA SHUICHONOE JUN; AKEUCHI KAZUO

PA - RIKAGAKU KENKYUSHO

TI - FULLERENE OLIGOMER AND ITS PRODUCTION

 AB - PROBLEM TO BE SOLVED: To obtain an unconventionally new fullerene-contg. compound.

- SOLUTION: This new compound, a fullerene oligomer, consists of carbon atom alone, the respective carbon atoms are mutually covalent-bonded in the form of single or double bond, and this compound has three-dimensional structure and one continuous hollow and is insoluble to toluene. The number of the carbon atoms in this compound is e.g. 104-120, or 156-174. This compound is obtained by polymerizing a full-erene compound in a solvent under ultrahigh pressure.

- C01B31/02 :B01J3/06

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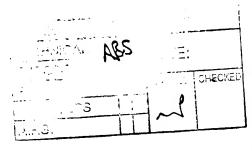






NEC CORPORATION % Reddie & Grose 16 Theobalds Road LONDON

WC1X 8PL



Your Reference: RCA/43891 Application No: GB 0130761.0 The Patent Office Patents Directorate

Concept House Cardiff Road, Newport South Wales NP10 8QQ

Examiner: 01633 814665

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20 May 2002

Dear Sirs

Patents Act 1977: Search Report under Section 17

I enclose two copies of my search report and three copies of the citation.

Although your application qualified for combined search and examination, I am not issuing an examination report at this stage. So far I have no objections to the application but I cannot complete my investigations until at least three months after the application has been published. The reason for this delay is to give anyone interested in the application a chance to make observations on the patentability of your invention, and to permit the search to be updated.

This letter does not require a response from you and I will write again when I send you my examination report.

Publication

I estimate that, provided you have met all formal requirements, preparations for publication of your application will be completed soon after 18 June 2002. You will then receive a letter informing you of completion and telling you the publication number and date of publication.

Amendment/withdrawal

^{*}Use of E-mail: Please note that e-mail should be used for correspondence only.







Application No: GB 0130761.0

20 May 2002

If you wish to file amended claims for inclusion with the published application, or to withdraw the application to prevent publication, you must do so before the preparations for publication are completed. No reminder will be issued. If you write to the Office less than 3 weeks before the above completion date, please mark your letter prominently: "URGENT - PUBLICATION IMMINENT".

Yours faithfully

Colin Clarke Examiner

Important information about combined search and examination

- (a) You may file voluntary amendments to your application at any time until the date when I issue my first examination report, which will be about three months after the application has been published. You will have a further opportunity to file voluntary amendments when you reply to the examination report.
- (b) About three months after publication I will bring the original search up to date and reconsider your application in the light of any new citations, voluntary amendments and observations on patentability and if necessary raise with you any resulting objections. If on the other hand I am satisfied at this time that the requirements of the Act have been met, I will issue a report to that effect. However, in this last case there is a possibility that I may not have access to all the patent applications published after the priority date of your invention and of possible relevance to your application. If this is the case I would have to complete the search after grant and if necessary raise any new found novelty objection then.







Application No:

GB 0130761.0

Claims searched:

1-8

Examiner:

Colin Clarke

Date of search:

17 May 2002

Patents Act 1977 Search Report under Section 17

Databases searched:

UK Patent Office collections, including GB, EP, WO & US patent specifications, in:

UK Cl (Ed.T): ClA (AJ5)

Int Cl (Ed.7): C01B 31/02

Other:

ONLINE: WPI, EPODOC, JAPIO

Documents considered to be relevant:

Category	Identity of document and relevant passage	Relevant to claims
A	Derwent Abstract 1997-420436 & JP09-188507A RIKAGAKU KENKYUSHO	

- Document indicating lack of novelty or inventive step
- Document indicating tack of inventive step if combined with one or more other documents of same category
- Member of the same patent family

- A Document indicating technological background and or state of the art.
- Document published on or after the declared priority date but before the filing date of this invention.
- Patent document published on or after, but with priority date earlier than, the filing date of this application.